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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/920,133	08/01/2001	Kazunobu Kubota	7217/65186	5686

7590 03/24/2004  
COOPER & DUNHAM LLP  
1185 Avenue of the Americas  
New York, NY 10036

EXAMINER

HARVEY, MINSUN OH

ART UNIT	PAPER NUMBER
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2644

DATE MAILED: 03/24/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/920,133

Applicant(s)

KUBOTA, KAZUNOBU

Examiner

Minsun Harvey

Art Unit

2644

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on March 8, 2004/.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-18 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. §§ 119 and 120**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
- a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1 to 18 are rejected under 35 U.S.C. 102(b) as being anticipated by Inanaga.

Inanaga discloses an apparatus which is comprised of processing an audio signal comprising: receiving a plurality of M sound source signals, each of the M sound source signal having source information including at least one of position information, movement information, and localization information (5, 9, 7 and 11)); synthesizing the M sound source signal to provide N sound source signals, the number N being smaller than the number M of the sound source signals, based on the source information of each of the M sound source signals (output from 5 and 9 and being synthesized at 15 and output from 7 and 11 and being synthesized at 16); synthesizing the M source information to produce N source information corresponding to the N synthesized sound source signals, based on the source information of each of the M sound source signals (it inherently synthesizes M source information at 15 and 16 when it synthesizes M sound source signals which contained source information); localizing the N synthesized sound source signals in sound image based on the N source information (outputs from 15 and 16); a virtual sound image localization for obtaining two-channel reproduced signals supplied to a pair of acoustic transducers to localize a sound image at an arbitrary position around a listener (24 and 25); a change instruction is supplied by a

user's operation (it is done by a movement of a listener's head); and the steps of changing a video signal in response to changes of reproducing localization positions of the M sound source signals (661 and 66).

3. This is in response to the applicant's remark, which was received on January 22, 2004.

On page 11, lines 7 to 13, the applicant has argued that "elements 38, 64, 31, 33 and 44 of Inanaga et al. merely show position information regarding a motion of a listener's head and not of sound source such as in the presently claimed invention". The applicant's argument is not persuasive because "synthesizing M source information to produce N source information corresponding to N synthesized sound source signal based on source information of each of the M sound source signals". The applicant's argument is not persuasive because as described above, synthesizing M source information to produce N source information corresponding to N synthesized sound source signal based on source information of each of the M sound source signals is read on elements 5 and 9 with 15 and 11 and 7 with 16. When M sound source signals are synthesized to provide N sound source signal, it would inherently synthesized M source information to produce N source information

On page 11, lines 14 to 20, the applicant has argued that "Inanaga et al. fails to disclose synthesizing M sound source signals based on source information of each of the M sound source signals. Elements 6, 8, 10 and 12 of Inanaga et al. are means for storing impulse responses corresponding to a direction of a motion of a listener's head and not synthesizing means such as in the presently claimed invention ". The

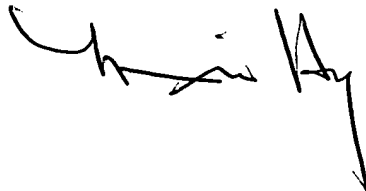
applicant's argument is not persuasive because as described above, Inanaga reference does disclose synthesizing means as claimed.

The examiner maintains the rejection as set forth above.

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Minsun Harvey whose telephone number is (703) 308-6741. The examiner can normally be reached on Mondays-Fridays from 9:00 to 5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bill Isen, can be reached on (703) 305-4386. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9314.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 306-0377.



MINSUN OH HARVEY  
PRIMARY EX